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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/599,369	09/27/2006	Bernardus H.W. Hendriks	GB 040078	7688

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PHILIPS INTELLECTUAL PROPERTY & STANDARDS
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EXAMINER	
COLLINS, DARRYL J	

ART UNIT	PAPER NUMBER
2873	

MAIL DATE	DELIVERY MODE
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/599,369	HENDRIKS ET AL.	
	Examiner	Art Unit	
	DARRYL J. COLLINS	2873	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *12 May 2008*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-13* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-13* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *27 September 2006* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☒ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Response to Arguments

Applicant's arguments filed May 12, 2008 have been fully considered but they are not persuasive. The examiner maintains that one of ordinary skill in the art at the time the invention was made would have found it obvious, in view of the optical apparatus as taught by Onuki et al having the automatic control feature, to control and monitor the various parameters of the instant invention in an effort to change or maintain the focal length of the lens system. Therefore the previous rejection is repeated below.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Onuki et al (U.S. Patent Number 6,806,988).

Although, Onuki et al teaches a controllable optical lens system, comprising a chamber (column 5, lines 50-54) housing first and second fluids (Figure 2, elements 121 and 122, respectively), the interface between the fluids defining a lens surface (Figure 2, element 124), an electrode arrangement (Figure 2, elements 103 and 125) for electrically controlling the shape of the lens surface (column 6, lines 8-12), the electrode arrangement comprising first (Figure 2,

element 121) and second (Figure 2, element 122) electrodes, a power source (Figure 2, element 126) for supplying current to the electrodes (column 6, lines 8-12), Onuki et al fails to explicitly teach a means for monitoring the current supplied by the power source over time and deriving the charge supplied, a means for monitoring the voltage on one of the electrodes of the electrode arrangement, and a means for deriving from a desired lens power a value for controlling the total change to be supplied to the electrode arrangement as claimed in independent claim 1. However, given the teaching by Onuki et al of a CPU (Figure 9, element 130) and control feedback loops (Figure 9) of the electrical parameters, it would have been obvious to one of ordinary skill in the art at the time the invention was made, to produce a controllable optical lens system wherein electrical parameters, such as current and voltage, are monitored and adjusted to provide proper focus of the lens system as claimed in independent claim 1.

Onuki et al also teaches a controllable optical lens system, as described above, wherein the means for deriving a value is for deriving a ratio of the charge supplied to the voltage (column 8, lines 63-67) as claimed in dependent claim 2.

Onuki et al again teaches a controllable optical lens system, as described above, wherein the power source is also for maintaining a constant voltage and is controlled to maintain the voltage on the one of the electrodes after the derived ratio between the charge supplied and the voltage had been reached (Figure 8E) as claimed in dependent claim 3.

Onuki et al further teaches a controllable optical lens system, as described above, wherein the means for deriving comprises a look-up table (column 9, line 66 – column 10, line 4) as claimed in dependent claim 4.

Onuki et al still further teaches a controllable optical lens system, as described above, wherein the look-up table receives as input an effective electrode height, which depends on the lens power, and provides as output the ratio of the charge supplied to the voltage (Figure 10, steps S121, S122, S123 and S124) as claimed in dependent claim 5.

Still further, Onuki et al teaches a controllable optical lens system, as described above, wherein the electrode arrangement comprises a drive electrode arrangement comprising a base electrode (Figure 2, element 103) and a side wall electrode (Figure 2, element 125) as claimed in dependent claim 6.

Onuiki et al teaches all of the claimed limitations as outlined above with respect to dependent claim 6, but fails to teach an annular electrode surrounding the chamber. It should be noted that providing an annular electrode is very well known in the optical art, therefore it would have been obvious to one of ordinary skill in the art to at the time the invention was made to provide an annular electrode to apply a uniform control for the shaping the fluid lens.

Once again, Onuki et al teaches a controllable optical lens system, as described above, wherein the first fluid comprises a polar and/or conductive liquid (column 6, line 21) and the second fluid comprises a nonconductive liquid (column 6, lines 17-18) as claimed in dependent claim 8.

Again, Onuki et al teaches a method of driving a controllable optical lens system, comprising a chamber (column 5, lines 50-54) housing first and second fluids (Figure 2, elements 121 and 122, respectively), the interface between the fluids defining a lens surface (Figure 2, element 124), an electrode arrangement (Figure 2, elements 103 and 125) for electrically controlling the shape of the lens surface (column 6, lines 8-12), the electrode

arrangement comprising first (Figure 2, element 121) and second (Figure 2, element 122) wherein the method comprises selecting a desired lens power (Figure 10, element S122), deriving from the desired lens power a value for controlling the total charge to be supplied to the electrode arrangement (Figure 10, element S124), supplying current to the electrode arrangement (Figure 9, element 131), but fails to explicitly teach monitoring the current supplied over time and deriving the charge supplied and monitoring the voltage on one of the electrodes of the electrode arrangement and applying current until the total charge supplied to the electrode arrangement reaches the desired value as claimed in independent claim 9. Still again, given the teaching by Onuki et al of a CPU (Figure 9, element 130) and control feedback loops (Figure 9) of the electrical parameters, it would have been obvious to one of ordinary skill in the art at the time the invention was made, to produce a controllable optical lens system wherein electrical parameters, such as current and voltage, are monitored and adjusted to provide proper focus of the lens system as claimed in independent claim 9.

Onuki et al also teaches a method of driving a controllable optical lens system, as described above, wherein deriving a value comprises deriving a ratio of the charge supplied to the voltage (column 8, lines 63-67) as claimed in dependent claim 10.

Onuki et al again teaches a method of driving a controllable optical lens system, as described above, further comprising maintaining a constant voltage on the one of the electrodes of the electrode arrangement after the derived ratio between the charge supplied and the voltage had been reached (Figure 8E) as claimed in dependent claim 11.

Onuki et al further teaches a method of driving a controllable optical lens system, as described above, wherein the deriving a value indicating the total charge to be supplied

comprises accessing a look-up table (column 9, line 66 – column 10, line 4) as claimed in dependent claim 12.

Onuki et al still further teaches a method of driving a controllable optical lens system, as described above, wherein the look-up table receives as input an effective electrode height, which depends on the lens power, and provides as output the ratio of the charge supplied to the voltage (Figure 10, steps S121, S122, S123 and S124) as claimed in dependent claim 13.

Conclusion

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to DARRYL J. COLLINS whose telephone number is (571)272-2325. The examiner can normally be reached on 6:30 - 5:00 Monday - Thursday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ricky Mack can be reached on 571-272-2333. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Darryl J. Collins/
Primary Examiner
Art Unit 2873

14 July 2008